ON A NEW EYELESS SPIDER OF THE FAMILY LINYPHIIDÆ FROM POTTER CREEK CAVE, CALIFORNIA

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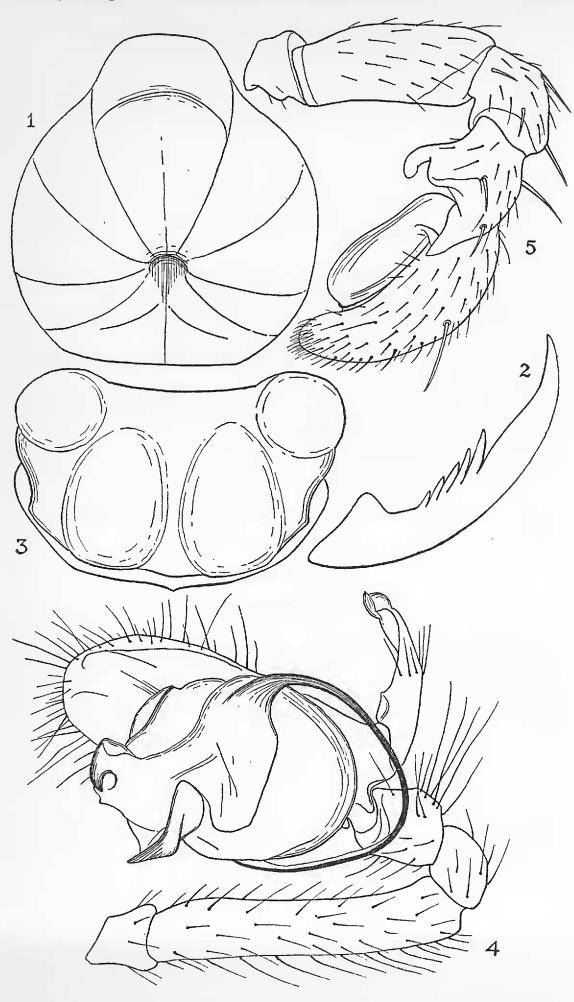
The spiders reported upon in the present paper were collected in Potter Creek Cave by Mr. W. J. Sinclair in 1903 and were transmitted to me for study by Prof. C. A. Kofoid. One of the specimens represents a widespread species of Xysticus. This is not normally a cavernicolous form and its occurrence in Potter Creek Cave was probably casual, spiders of various types often being found in caves near the entrance. The other specimens of the collection, however, represent a species which is apparently a wholly cave-dwelling form as indicated especially by the complete absence of eyes, in which respect it suggests another member of the same family, Anthrobia mammouthia, of the Mammoth Cave. The blind species of the present collection represents a new genus closely allied to Linyphia in habitus and general structure. Several cave-inhabiting species of Linyphia are known in which the eyes show various stages in reduction, the anterior median eyes being the first to show the effect of life in the dark. Members of the Linyphiidæ, many of which normally seek shade and moisture, are especially likely to be represented in any permanent spider fauna occurring in caves remote from the entrances.

LINYPHIIDÆ

Tuganobia Chamberlin, gen. nov.

Cephalothorax broad and depressed, the pars cephalica but little elevated; eyes not developed; clypeus broad, slanting forward from above; upper margin of furrow of cheliceræ with three well-developed teeth, the lower unarmed; palpi of female with well-developed claws which are pectinate over middle portion as in claws of legs; palpal organ of male similar to the ordinary type shown by *Linyphia*; embolus long and slender, curved; legs long and slender, setose but lacking true spines; paired claws with a series of teeth over middle region,

Genotype, T. potteria, sp. nov.



Tuganobia potteria Chamberlin, sp. nov.

General color of body and legs throughout pale yellow, with carapace, sternum and coxæ of legs more or less dusky; legs and abdomen wholly unmarked excepting that the dorsal vessel may show through the abdomen as a median longitudinal stripe.

Cephalic eminence dorsally rounded, low, set off by a depression separating it from clypeus. Clypeus slanting forwards to base of cheliceræ. Cephalothorax widely truncate behind, the pars thoracica broad and laterally rounded, depressed (fig. 1). Two upper teeth of superior margin of cheliceræ long and sub-equal, the lowermost smaller.

Legs long, setose but unspined. Paired claws typically with five teeth which decrease in length proximad as shown in fig. 2.

Abdomen high anteriorly, pointed behind, with spinnerets carried at end in caudoventral position, Linyphia-like.

Epigynum of female a well-chitinized plate without distinct processes (fig. 3).

Palpal organ of male large and freely exposed, the embolus forming a single coil curving back widely over paracymbium and about base and opposite side (fig. 4).

Length, 3.5 mm.; femur of first legs, 3.5 mm., that of fourth legs longer; tib. with patella IV, 4 mm.

One male (holotype) and ten females. Types in author's collection.

THOMISIIDÆ

XYSTICUS FORMOSUS Banks

While best known from the northeastern part of the United States, this species has been taken previously in California as well as in Arizona. Mr. Sinclair secured a single male of which the palpus is shown in lateral view in fig. 5. In coloration, eye relations, and spining of legs, the specimen is typical.

Fig. 1. Tuganobia potteria, sp. nov. Carapace of male holotype in outline from above. x 42. Fig. 2. Same. A paired claw of first leg of male. x 400. Fig. 3. Same. Epigynum of female paratype, ventral view. x 120. Fig. 4. Same. Left palpus of male holotype, in subventral view. x 60. Fig. 5. Xysticus formosus Banks. Right palpus of male, ectal view. x 73.